FEBRUARY - 1957 50c

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LIBRARY

# Announcing the 1957 Great Lakes Ceramic Hobby Exhibition

Chicago, III. - May 26, 27, 28, 29, 30



This year the Great Central Ceramic League invited the Great Lakes Exhibition to make Chicago its site for the 1957 Show. The invitation was accepted and the Great Central Ceramic League will be the acting host with the Michigan Ceramic Dealer's Association as a joint sponsor. The Conrad Hilton, the world's largest hotel, with its marvelous facilities will be the background for the 1957 show.

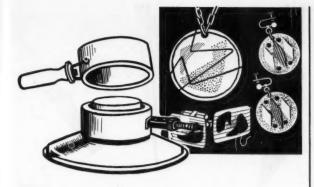
Conrad Hilton, Chicago

# There will be many exciting moments in store for you at the Great Lakes Exhibition. Plan now to attend. Check the following features:

- 1 A display under one roof of the best in ceramic materials with instruction on their use by manufacturers and suppliers.
- 2 Inspiring demonstrations by outstanding artists in their respective fields.
- 3 Special classes in the mornings by these outstanding artists for a limited number of people at a class rate.
- A "Fun for everyone Luncheon" with Gladys Workman, Scottsburg, Oregon, M.C.
- 5 A competitive display open to hobbyists from the United States and Canada.
- 6 A non-competitive display area open to teachers and small studios at a nominal cost.
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For further information write:

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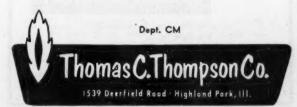
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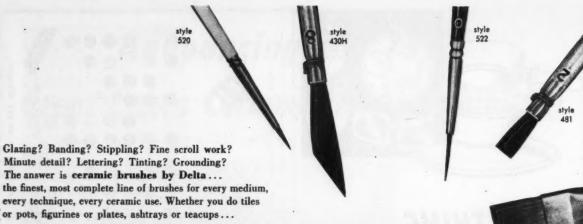
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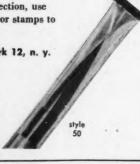
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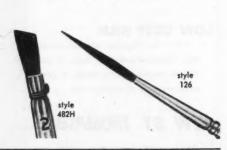
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# Ceramics MONTHLY

Volume 5, Number 2

FEBRUARY . 1957

50 cents per copy

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#### BARB AND BALM FOR BALL

Dear Editor:

. . . I want you to know how much I appreciate CM. Working alone here, I turn to it constantly . . . Incidentally, I have met F. C. Ball personally and I wish every one of your readers could know his magic, skill, good nature, humor and downright friendliness! . . .

ELLEN BAXTER Weyauwega, Wisc.

Dear Editor:

Four articles relative to stoneware have appeared to date in CM. They are in-teresting but tell very little that would be helpful, or what the average potter does not already know.

Mr. Ball has made some beautiful pots and he is recognized as an authority. May

I suggest that he include in his articles several formulas for clay bodies and also matt and gloss glazes, both suitable for cone 8. The method of glaze application, including thickness, would be helpful.

DANIEL JAMES SHEA Newtonville, Mass.

◆ By this time, articles five (January) and six (this issue), complete with formulas, etc., have reached Reader Shea—who had better duck. Brickbats are sure to be thrown by the Ball devotees (a vast majority!) who won't agree that "Ball's articles tell little."—Ed. EASY DOES IT?

Dear Editor:

The December issue is one of the best we have had for some time. I am, as always, intrigued by the articles of Mr. Sellers. My experience with closed shapes, however, would indicate that they are not as easy as pictured. I have trouble with the clay gathering in ridges when I at-tempt to close the form. It may be that

the clay he is using is more suitable . . . In spite of all, your magazine is still the best to be had.

A. J. SPENCER St. Petersburg, Fla.

The trick is in the technique, not the clay. Any good throwing clay will work, according to Tom Sellers (who is replying personally to Reader Spencer).—Ed.

BIG SHOW . . .

Dear Editor:

Your handling of the Syracuse Show [January] was pleasing. The layout was particularly nice . . . I wish you could devote more space to this type of feature so that the photos could be larger; I imagine, however, that there are many things to consider when allotting space . . . I was glad you were able to include the de-tailed descriptions of all the pieces . . .

JEAN BRADFORD Birmingham, Ala.

Dear Editor:

Congratulations on your fine coverage the "Big Show at Syracuse." Your inclusion of all the details relating to the pieces—size, color, decorating technique, etc.,—was received with open arms. Why can't you include this vital information every time you write up a show? . . .

Mrs. Mildred Fromer Chicago, Ill.

It's rare that this information is sent to us; we always try to include all vital sta-tistics supplied.—Ed.

NOTE FROM O'SEAS

Dear Editor:

I have been extremely interested in the few 1954 issues of your magazine which I could borrow from a friend. As I was then residing in Indonesia, where financial arrangements are difficult, I could not subscribe . . . Now [I can], and a friend who is a teacher of ceramics here is

equally keen to subscribe . . .
I am thankful for your kind attention and for your thorough and interesting [magazine]. We have none here, or in France, (in spite of the intensive life of pottery and ceramics) which has specialized in giving tips to beginners, ideas to experts and an impulse to would-be pot-ters. All this we have found in yours . . . Mrs. L. H. Corsane Algiers, Fr. North Africa

Johnson City, N. Y.

ENAMELING HANDBOOK FAN

Dear Editor:

I am enclosing a check for the CM HANDBOOK ON COPPER ENAMEL-ING. My enameling students have been inspired by the quality work shown in this book. Unfortunately, there are also some horrible [books and other] literature on enameling available, so I hope your book

will have wide distribution.

May I suggest that you design a cover that will be compatable with the contents?

FLOTENCE MOORE

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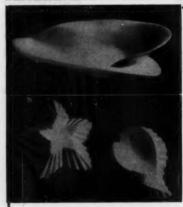
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FEBRUARY, 1957

7

# Shopper

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cal instruments, horses, sport symbols, Oriental designs and stylized patterns. To obtain a complete, illustrated description including prices, write to the Copper Shop, 1812 E. 13th Street, Cleveland 14, Ohio, mentioning Ceramics Monthly.

## **New Spray Booth**



Designed to fill the need for a compact floor-model unit, the new Craftool Spray Booth occupies a minimum amount of floor space—24" x 28"—and stands 60" high. It is equipped with a glass-wool filter unit which

catches the spray mist and residue, eliminating the need for an outside vent or exhaust; the filter is easily replaceable.

An air filter and regulator is available as an accessory and can be attached to the unit. These permit control of the air pressure on the booth and provide a condensation chamber for removing water from the air line.

A free catalog and other detailed information are available from Craftools, Inc., 401 Broadway, New York 13, N. Y. Please mention Ceramics Monthly when writing.

### **Felt Pads**

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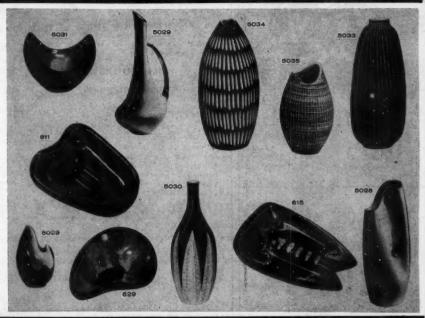
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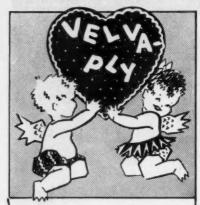
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#### WHERE TO SHOW

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CANADA, TORONTO May 1957

Canadian Ceramics of 1957, second all-Canada pottery exhibition under the auspices of the Canadian Guild of Pot-ters and the Canadian Handicrafts Guild, at the Royal Ontario Museum of Fine Art. Selections from show will be sent on tour to the larger cities of Canada. Write to the Canadian Handi-crafts Guild, 2025 Peel Street, Montreal 2, for further information.

CONNECTICUT, NEW LONDON May

Annual Exhibition of Society of Con-necticut Craftsmen—for members. Entry blanks due April 15. For details write Mrs. Robert M. Pettit, 16 Glendale Rd., Glenbrook.

FLORIDA, CORAL GABLES March 5-March 24

★Fifth Annual Miami National Ceramic Exhibition, sponsored by the Ceramic League of Miami at the Lowe Art Gal-lery. Open to potters, ceramic sculptors and enamelists working in U.S. Deadline out-of-town entries, Feb. 11; local entries, Feb. 13. Jury. Prizes: \$2625. Write Juanita May, 1953 Tigertail Ave., Coconut Grove, Florida.

INDIANA, SOUTH BEND

May 12-26 Fifth Annual Michiana Regional Ceramics Exhibition at South Bend Art Association, 620 W. Washington Ave. Open to residents and former residents of Indiana and Michigan. Jury; \$1000 in purchase and merit awards. Fee, \$2. Blanks due April 30; work, April 30-May 5. For blanks write Eleanor Rupel, Asso.

KANSAS, WICHITA April 13-May 20

\*Twelfth National Decorative Arts-Ceramics Exhibition at Wichita Art Associamics exhibition at Wichita Art Association Galleries. Pottery, mosaics, ceramic sculpture, enamels included; all American craftsmen eligible. Jury; \$2000 in cash and purchase awards. Fee, \$3. Entries due March 4-16. For blanks write Maude G. Schollenberger, president, Wichita Art Asso., 401 N. Belmont Ave.

MARYLAND, BALTIMORE March 24-April 21

Regional Exhibit for Artists and Craftsmen at Baltimore Museum of Art. Residents of Delaware, Maryland and Washington, D. C. eligible. Jury; prizes. Entry cards due February 15; work, February 23-28. For blanks, write Mrs. V. Townsand at the Museum 15. send at the Museum.

#### WHERE TO GO

DELAWARE, NEWARK February 5-26

American Jewelry and Related Objects, contemporary, at University of Delaware.

FLORIDA, JACKSONVILLE through February 10

New England Crafts (Smithsonian Institution Traveling Exhibition) at stitution Traveling Exhibition) at Jacksonville Art Museum. Contemporary.

LOUISIANA, NEW ORLEANS February 17-March 24

56th Spring Annual of the Art Association of New Orleans—at Isaac Delgado Museum of Art. All mediums.

MICHIGAN, DETROIT March 5-31

Michigan Artist-Craftsmen Exhibition at Detroit Institute of Arts.

NEW HAMPSHIRE, CONCORD

opening Mid-February
New Hampshire Craft Guild Exhibition
at The League of New Hampshire Arts
and Crafts, 205 N. Main St. Juried show representing work of League craftsmen; will move to deCordova Museum, Lincoln, Mass. for March display.

NEW JERSEY, MONTCLAIR through February 10

Finnish Crafts (contemporary); Mont-clair Art Museum.

NEW YORK, BUFFALO February 5-March 1

Tenth Annual Exhibit of Creative Ceramics by the Ceramic Section of the Buffalo Museum of Science, Humboldt

New York, Buffalo March 7-April 14

23rd Annual Exhibition, Artists of Western New York (14 counties), at Albright Art Gallery, Buffalo Fine Arts Academy.

NEW YORK, GENESEO February 10-March 3

American Craftsmen, contemporary show circulated by Smithsonian Institution, at College Center, State University Teachers College.

Ohio, Akron through March 3

Adventures in Hi-fire, an exhibition of contemporary porcelain by Luke and Rolland Lietzke at Akron Art Institute.

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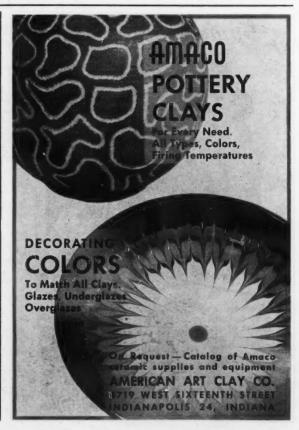
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# SEVEN DECORATING TECHNIQUES

# Using Slip as the Medium, the Author says "FISH" in Seven Different Languages

by KARL MARTZ

The possibilities inherent in the use of engobes, or slips, for decorating purposes are definitely rewarding—if the approach is inventive with an eye to fully exploiting the opposing aspects of the several techniques. Brushing, inlaying, trailing, incising, stenciling, reserving: all the techniques have special qualities which wait only to be recognized and used creatively.

An engobe and a slip are actually the same material—a fluid mixture of water and clay or other ceramic materials. The difference between the two terms is one of usage. When slip serves a decorative purpose and covers all or large areas of a piece, it is usually called an "engobe." For contrast, an engobe is always a different color than the clay body on which it is used.

In most cases engobes or slips are applied to a pot when it is leather hard or dry; for wet trailing, however, the clay must be moist. Only rarely is an engobe applied to a bisque piece.

Starting with any given idea, each of the techniques illustrated here will produce a result distinctly different from the others. Let us take, for example, a single subject—fish—as the basic idea and see how each decorating method can suggest its own special way of saying "fish."

Slip Painting: A slip made more unctuous and brushable than usual by the addition of glycerine and Karo syrup is used for slip painting. Because damp clay is more receptive to slip, the piece is thoroughly sponged immediately before the painting begins. A Japanese brush may be used and a good deal of experimental practice is required in order to discover what kind of strokes and other marks the brush can be counted on to make.

The design should be painted freely. It would spoil the feeling and possibilities of the technique—it would be an insult to the brush—if slip painting were to be executed merely by filling in a pre-drawn outline.

Slip Trailing: In contrast to slip painting, slip trailing is used for linear design. The line produced is raised, thick and fluid looking. It is made with a syringe-type of device from which the slip is allowed to flow with only partial control by hand pressure on the bulb. Once the tube is set down to the surface of the piece, the continuous flow of slip leaves no time for pondering. The slip flows whether the hand moves or not. A quick movement leaves a thin line, sometimes with skips. Momentary hesitations are recorded by an extra thickness at the beginning of a line and at the point where the line doubles back on itself. Since this method demands continuous action an expression as personal as handwriting is extracted almost by force from the decorator.

A simple arrangement for slip trailing can be made
(Please turn the Page)

This article is based on the original article by Karl Martz, "Decorate with Engobes," which appeared in the February, 1953 issue of CM. That number went out of print immediately. The article—re-edited and reworked—is produced here in response to the many requests for copies of "that Martz article," and for the many thousands of new readers who will want to read and possess a copy of their own.—Ed.

Photos: Photographic Laboratory, Indiana University



Mishima

Slip Painting

# Saving Control of the Control of the

Slip Trailing



Wet Slip Trailing

## SEVEN DECORATING TECHNIQUES (cont.)

from a balloon and a medicine dropper. Remove the small rubber bulb from the dropper and in its place firmly attach the balloon with a rubber band. (Save the rubber bulb to use later as a tight-fitting slip-on cap for the open end of the dropper; it will prevent leftover slip from evaporating for weeks.

If desired, the size of the glass tube's opening can be changed by softening the tip with a gas flame. The balloon may be filled with fluid slip simply by pouring a thin stream into its mouth; if the slip is pasty a small funnel will be helpful. The advantage of this particular slip-trailing device is that the limp balloon never sucks air back into the slip, thus interrupting the flow of slip, as does a syringe.

Wet Slip Trailing: Here is a fascinating technique which is used for English slipware. Although it has not been exploited by present-day American potters, the method seems uniquely capable of producing contemporary expression. Its excitement stems from the lack of all but the most rudimentary control: one never knows how it will end!

In the example shown here, white engobe was poured over a flat disc of moist clay and allowed to drain off (on moist clay an engobe remains wet and mobile for a long time). Black slip was then trailed onto the wet surface. As the two slips mingled and settled to a common level, a certain amount of distortion inevitably occurred-this is the charm of the technique; in fact, the distortion is often exaggerated by shaking the piece or rapping the underside. The fish design was developed further with the tip of a small brush drawn through the upper fin, around the eye, and out from either side of the jaw to produce whiskers. When the slip had dried enough to be firm, the flat disc was given its form (any type of drape mold can be used to shape such a piece).

Sgraffito is easy to do and a favored technique when an intricate-line pattern is desired. Essentially it is a kind of engraving technique which derives its name from the Italian word meaning scratched. The piece is first coated with engobe (in the example shown a dark-colored clay was covered with light slip). When the engobe has become firm but is still soft, the design is scratched or cut through, revealing the body beneath.

Width of line varies with the pressure applied to the incising tool used. A stimulating contrast in the quality of line produced—ranging from broad gouges done with a wire loop to thin penlike lines made with a needle point—can be achieved if a variety of "scratching" tools are used. The contrast is more exciting visually than a line of unchanging quality. Tools with loop ends, flattened ends, blunt points or sharp points, tools with notches or wide-angled points, may be used for sgraffito.

Mishima is the inlaying technique said to have come from Korea and widely used in a certain section of Japan. It is the reverse of sgraffito in that the design is incised or imprinted in soft or leather-hard clay and then filled with slip. The slip is brushed carefully into the depressions—and unavoidably over most of the surface as well. When dry, the surface is scraped clean so that slip is left only in the incised or imprinted marks.

Most Occidentals seem to feel more at home doing mishima or sgraffito than slip painting or slip trailing; perhaps this is because a rigid incising tool is more closely related to our familiar Western writing instruments than is the brush or slip trailer.

In the example shown, the upper fish design was incised; the lower was imprinted with a V-shaped stamp. A piece of hack-saw blade, its round end notched with a needle file, was used to cut the border pattern. Richly textured, brocade-like effects can be developed by allover imprinting with simple stamping tools made of bisqued clay.

Paper Friskets are a kind of stencil or mask used under engobes. The friskets, saturated with water, are laid on a dry clay surface and a slip is brushed over them. As soon as the engobecovered surface is dry enough to be handled without damage, the friskets are carefully peeled off with a needlesharp pointed tool. The shapes which friskets yield have an extreme precision which cannot be obtained in any other way.

It is a good idea to use small simple paper units for the design because they will lie close to the surface of the piece better than large, complex shapes which tend to wrinkle and buckle. By combining a number of small units, complex motifs can easily be built up.

Newspaper is a good material for friskets: it can be cut with a sharp knife or blade and duplicate units can be produced by cutting through several layers at a time. Dripping wet, the paper shapes will hold to the surface of the piece but when many friskets are being applied, the first ones laid down may have to be re-moistened quickly with a wet brush just before the engobing process begins.

Rubber Resist might be thought of as a liquid frisket. It is a liquid rubber (rubber latex) to which an engobe will not adhere. The material is brushed, in a design, directly on the dry clay surface. After a few minutes it becomes dry and then an engobe is brushed over the surface. When the engobe has become firm, the rubber is peeled off revealing the clay body beneath. The resulting decoration is like slip painting in reverse since it consists of brush strokes in the clay-body color against a background of engobe.

Rubber latex is a rather thick, white liquid which, when brushed on clay, dries to a nearly transparent, dully glistening film. The rubber may be removed by pricking it with a very sharp-pointed tool and peeling with a slow firm pull.

Ordinarily, this rubber is used for making flexible molds. It can be made to flow more readily for brush work if thinned a little with diluted ammonia. Ammonia should also be used for cleaning the brush immediately and thoroughly after use because rubber cannot be removed if allowed to dry in the brush.

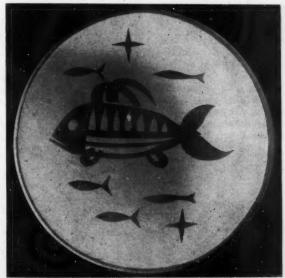
As a resist material, rubber has very definite advantages over wax. It can be worked from the brush more easily than melted wax and it does not deteriorate in the jar. No bisque firing is required to burn out the rubber as is the case with wax. Moreover, liquid rubber is immediately obtainable.

AFTER trying these methods and visually tasting their different qualities, one begins to think of combinations of one with another. An enriched visual orchestration can be achieved by using slip painting with sgraffito, mishima with slip trailing, two colors of slip superimposed each with its own pattern in rubber resist. The possibilities multiply astoundingly. We become impatient with our pedestrian hands as the mind races like ground fire through the permutations of body, slip, glaze and technique. Body textures smooth or coarse, sparked by slip stippled or smeared or brushed, light upon dark, dark upon light, speckled, streaked. Glazes that flow, that pool, that are clear or murky, revealing, obscuring, enhancing, and all of it spiced with color. Slip sensuously brushed, crisply incised, regimented with friskets, trailed with abundant wetness. These are the potter's alphabet. We need only the

courage to use it. • Coming Up: Mr. Martz gives recipes and other specific, helpful information.



Sgraffito



Paper Friskets .



**Rubber Resist** 

# CHAMPLEVE An Enameling 7

(Part 1)

The type of enameling in which sunken or recessed areas in a piece of metal are filled with enamel colors is called champleve (pronounced shom-pleh-vay'). In the finished piece, the sections of enamel are level with bare metal surfaces which may or may not be polished. The contrast between metal and enameling is the important element in the design, giving champleve a character quite different from most other forms of enameling. It is also lighter in weight, a quality which recommends it for jewelry and accessories.

A design for champleve should be worked out carefully on paper so you can see what effect the exposed metal is going to have on the enameled areas. A black-and-white sketch (one value representing metal, the other enamel) is an aid in detecting the pattern the metal itself will make. A color sketch should also be made. In this sketch the color of the metal should be matched because this color is the dominating factor in the selection of the enamel colors to be used, and it must be taken into consideration if results are to be pleasing. Moreover, since the metal itself shines, you have to be careful about the variety of brilliant colors used, particularly of transparents since they are more brilliant than opaques.

There are two parts to the champleve process: 1) etching the metal, and 2) laying in enamel colors. The etching part is the longer and more involved. It usually takes several hours and frequent checking before the etching fluid can eat away the metal to the depth desired (which is usually one-half the thickness of the metal).

Either a nitric acid or a ferric chloride solution may be employed for etching. Ferric chloride, not being dangerous to use as is acid, may be preferred for safety as well as other reasons. It does stain clothing, but not the hands if washed off immediately. The actual etching time required may be longer but, on the other hand, it is not necessary to swab the piece frequently to remove air bubbles as is the case with acid. When the design on a piece is small and intricate, the ferric chloride type of bath is recommended because it makes for a neater etching (although, of course, an irregular edge may be desired on certain designs).

Ferric chloride may be purchased in lump form at chemical supply houses (the pharmacist can give you sources): the "purified grade" is less expensive than the better quality and will do the job. Because the material can pick up moisture and deteriorate, it should be stored in a dark place in a tightly covered jar. It is better to mix a batch as you need it since with re-use, the chemical gradually loses its etching power. A saturated solution is used—meaning all the ferric chlor-ide the water will dissolve. The proportions for making a cup of the solution are, roughly, 1 cup of ferric chloride to 4 cup of water. The mixture should be left standing for an

hour or so before using.

If a nitric acid solution is preferred, the proportions should be one part acid added to about three parts water; the etching time required depends on the strength of the solution.

The copper used for champleve should be thick enough to allow for good depth in the etching: 18-gauge is satisfactory (but it might be worthwhile to experiment with the slightly thinner 20-gauge when opaque enamels are being used and a shallow etching will suffice).

In cutting the metal shape, it is a good idea to make it a little larger than the design calls for—1/16" extra all the way around—to allow for irregularities which may occur during the etching process (excess metal can always be filed away afterward). Doming or other shaping of the piece, if any, is done at this time. If holes are needed, as for pendants or bracelet links, it is much easier to drill them after the etching is finished.

Cleaning and counterenameling come before etching. The back of the piece can, of course, be left bare if opaques are to be used on the front, but if your plan calls for transparents, the piece must be counterenameled to prevent future cracking. The procedure is as usual—normal firing, stoning and acid cleaning.

The champleve process itself is demonstrated, here, in the making of a dress clip. An abstract design is to be etched in copper, and then filled

(Text continued on Page 28)





BEGINNERS should find simple designs such as these not too difficult. Recessed areas created by etching were filled with ename! by the wet-inlay method. This is the other part of the champleve process and it will be discussed in full detail next month.

# ing Technique—Etched Areas are Filled with Enamel Colors



1. After back of piece is counterenameled, a design is traced on the front.



be protected with asphalt varnish.



2. All areas not meant to be etched must 3. These areas are completely covered, the varnish being applied by brush.



4. Varnish is also brushed on bare areas left on back for findings.



5. Then the piece, supported by wire or a trivet, is set face down in a jar.



6. Etching solution of ferric chloride is carefully poured in at the side of the jar.



7. Periodically, the piece is washed and checked to see if etching is deep enough.



removed with a cloth wet with benzene.



8. When etching is finished, all asphalt is 9. Finally—scrubbing with brush and pumice, then soaking in acid for last cleaning.



Photo: Alice K. Fajen

# CLAY and the VISUALLY HAN

by MURIEL ANDERSON

ne day in February of 1955 a young art instructor in Milwaukee put into action an idea he'd been thinking about for a long time. Some people said it wouldn't work—that it was almost an impossible task. Gaar Lund, however, felt in his heart that it could work and he walked into his first art class for visually handicapped children, anxious for a chance to prove it.

Many of us are so accustomed to visual communication in art that it is hard to think of it as being practical for the sightless, or nearly sightless, child. But Mr. Lund was convinced that such a child could receive invaluable rewards from working in this kind of class. It would seem he was entirely right about this, for although he has since moved East to teach art in Bound Brook, New Jersey, the class

he started in 1955 has grown to be an integral part of the Children's Arts Program (CAP) at the Milwaukee Art Institute co-sponsored by the Milwaukee Junior League. You have but to watch the eager smiles on the faces of these youngsters, to listen to their bubbling conversations as they work, and "proof of the pudding" is before you.

In the beginning there were a few parents, and some instructors, who were slow to accept the possibilities of this experimental class. Mr. Lund readily solved that problem by asking doubters, "When is art most meaningful to the artist—when he is creating, or later when he is viewing what he has created?" Most everyone agreed that for the sighted or the sightless, the greater joy is in the doing.

Clay is a natural for the blind child and is particularly excellent for a first project. Both Mr. Lund and Miss Joan Christopherson, who has taken over the class since he left, have found the youngsters enthusiastic about working with clay. There is an extra sensitiveness in the small fingers of these children; and there is an extra sensitiveness in the soft, plastic clay which responds to even the slightest pressure. Another item of particular importance with these students is the fact that contact with the clay is maintained all the while it is being worked on-not true with other materials.

As an introduction to the clay, each child receives a ball of well wedged, plastic clay which will fit comfortably in his hands. He begins with an exploratory period—squeezing, pinching,

fingering-getting the feel of the material and learning what it will do: Then the child creates an object from memory or from his imagination, pinching and pressing out the shape until it feels right, but sticking to forms where all parts are close together.

The first real project, where the clay is controlled by the student to make a predetermined object, is the pinch pot. It works out beautifully! With the clay ball held in the palm of one hand, the thumb of the other hand is forced into the center. By turning the ball and applying equal pressure with the thumb and forefinger, a small pot is formed. There is great excitement as the child feels the shape work its way out of the clay

To stimulate the imagination and create an interest in the abstract, the children examine abstract sculpture made by other classes, of sighted children, and try to decide what these abstractions mean to them. Then they experiment with their own forms and shapes.

Many of the children have enjoyed creating small clay animals, and after they've been fired, taking them home for their rooms, to enjoy themselves and to share with their families.

A clay project is usually finished by these children in three lessons. Students usually prefer not to place any kind of decoration on their work that roughens the surface for there is a great deal of pleasure found in touching the smoothness of the clay.

It is important that an art instructor in a class for the visually handicapped help his students adhere to high standards and the instructor must deal wisely with his own emotions. He must instill confidence and he must constantly encourage but he must keep a careful reign on his own sympathetic tendencies. It is often too easy to say, "that's fine" because of sympathy for the handicapped child, but instructors at CAP know the job at hand is to help the child grow and measure up to the best he has to give. There are valuable "extras" that come to the children in this class. One of these is their learning to socialize as boys and girls, not as handicapped youngsters. Their self confidence, too, is bolstered when they can proudly carry their work home for loving families to enjoy.

Art has long been accepted as a theraputic measure for the blind child but it is only recently that it has been given a chance to become really creative, a joy to the child who can-not see. There are still only a very few such classes in the United States and almost nothing to be found in the way of research material. Establishing such a class and building it into a successful part of a teaching program is a job with a great challenge to it. CAP is proving that every bit of effort expended is worthwhile.

Miss Chris, as the pupils warmly call Joan Christopherson, has found that another highly successful medium

is the lowly fire brick. This proves excellent for a three-dimensional project, as does a block of foam glass. The latter is very light and can be carved with such simple tools as a table knife, spoon or small file. Other projects which have proved successful include toothpick constructions, wire sculpture, papier mache' puppets and making "pictures" with scraps of material, shells, sand, twigs, stones, etc., all of which can be "seen" well with the fingers.

Miss Chris has been teaching this class for the last two years and has tremendous enthusiasm for the project. "We are often too pre-occupied with the limitations of the blind child," she says, "thinking always in terms of what he lacks, of his dif-ference. It is important, instead, that we think and teach in terms of what he has. True, here is a child who cannot see, but here also is a child who is using his other senses to the greatest degree possible. These children have the same problems of growing up, the curiosity, tensions and sometimes confusions of the sighted child.'

The smiling young instructor answered quickly our question about the prerequisites for an instructor. "One of the most important of all, I think, is an abundance of patience. Even with the sighted child there may be a few times of failing before he succeeds in a project. With the handicapped child, we must be prepared for perhaps a dozen false starts, a dozen

(Please turn to Page 34)

# DICAPPED child



Seeing with extrasensitive fingers, two students get inspiration from sculpture. At right—a pinchpot well on its way.

Gaar Lund who started the program is shown at right. At top, on facing page, "Miss Chris" with a group of enthusiastic youngsters.







FASCINATED is the word for the onlookers as they watch the author lift redhot raku from the kiln and plunge it into cold water.

# for sizzling drama . . .

# MAKE YOUR OWN

It's fascinating to see—and hear—glaze mature in a matter of minutes. In "Japanese Raku," October, 1956, Freda de Castro explained the origin of Raku and the cold water plunge which produces it. Here she describes just how she does it. All you need are low-fired bisque pots made of heavily grogged clay and glazes that are highly fluxed. Firing can be done in any kiln or approximation thereof—some people use a bonfire!—Ed.

pieces through the glaze firing and out of the kiln cool enough to handle, all in just one hour? It sounds like an invitation for you and your pots to live dangerously, but in reality it is the Japanese technique of raku glazing which has been used safely for centuries. Raku is a ware usually characterized by thick-walled, simple shapes bearing crackled, satinlike glaze the depth of which is almost comparable to that of high-fired glazes (see "Japanese Raku," October). Traditionally, the Japanese

Tould you like to see one of your

have always favored raku for tea bowls and other vessels connected with the tea ceremony of their country.

The glazing process is simple. In brief, a highly fluxed glaze is applied (by dipping,

spraying or brushing)

to a bisqued pot made of grogged clay; the piece is fired quickly at low temperature (bonfire heat), removed as soon as the glaze matures, and plunged immediately into a cold-water bath.

The relative speed of firing, the lure of the molten-lava effect, and the climax of fire-and-water sizzle make the process fascinating either to do or to watch. Professional and non-professional ceramists are attracted by the subtle and widely ranging colors that are possible, as well as by the comparative ease of the technique.

Only minimum equipment is needed: the bisque-fired pots and glazes, asbestos gloves and long-handled tongs, cones 019 and 014, a pre-heated kiln or other type of fire, and a bucket or deep pyrex dish of cold water.

Any type of kiln will do. If no kiln is available, one can be built in the back yard. Simply assemble a double-walled hexagon of fire brick, building it a foot higher than the pots will be; dig a trench on the windy side, insert





Photo: Metropolitan Museum of Art

EXAMPLES of raku ware. Japanese—above and below. Author's—mosaic at right; shallow tray and bowl on the facing page.



Photo: Museum of Fine Arts, Boston



# NRAKU Glazing Time: 60 Minutes

dry wood or charcoal, and stoke the fire slowly and steadily. This primitive method takes longer to heat up but once it's glowing hot, it serves the same as a modern kiln.

Whatever the type of heat, have it going in plenty of time to be ready for the pots when glazed. If the kiln is the conventional type, preheat to cone 019 with the lid open, and provide sanded or asbestos-lined shelves to set the pots on.

The bisque pots you choose for raku glazing must be able to survive the rude shocks of sudden heat and sudden cold to which they will be subjected. Simple shapes are best to use; they should be made of grogged clay and bisque-fired to at least cone 04. (Slip-cast pieces would not be sturdy enough and in any case their thin walls and precision casting would be lost under thick-glaze application.) Good craftsmanship in the pots will also spare you grief. There should be no strain in the construction, no abrupt differences in wall thickness, no trapped air pockets, no fussy or jut-

ting protrusions.

Glazes that are highly fluxed are required. Below is a basic recipe which can be varied in any one of a number of ways:

Frit #33
Red lead
White lead
Cullet
Quartz
30%
China clay
4%

Grind dry, add water slowly until the consistency is like thick cream. Sieve 1/4 cup of Karo (or double your favorite siccative) into each quart of glaze to prevent the glaze from pulling away from the clay when set in a hot kiln.

If you have your own favorite leadbase glazes in the cone 07—02 range, you will find they will also work well for raku.

Dipping is the easiest way of applying the glaze, especially if you are working on pinchpots. Or use a well-loaded brush. In any case, apply a heavy coat—from ½ to ¼ inch thick—to get the richest effect; the glaze

comes out unpleasantly shiny if applied too thin.

If larger or multiple pieces are involved, you may want to spray them. When you do this, and are using a glaze with high lead content, protect yourself against the fumes by wearing your mask or a damp cloth tied bandit style over your mouth and nose.

In general, apply the glaze generously and don't strive for an even coating. A slick-finished surface is not the aim for raku ware; but do control the temptation to be over-splashy. Don't rationalize about dripping areas of glaze; are they really focal points, or more like medusa heads?

The foot rim on raku pots is usually left unglazed in Japan. The warm tone of the clay body is considered a harmonious accent, and certainly it simplifies setting the piece in the hot kiln. If you prefer a glazed foot, however, it is possible to set the piece on metal-tipped stilts in the kiln—if you have a steady hand. But you had better lay in an extra supply of stilts because they are more apt to break in this situation than in ordinary circumstances.

Place the glazed pots around the edge of the heating kiln to drive out all moisture absorbed from the glaze and to insure against their bursting when thrust suddenly into the red-hot firing chamber. (If the glaze has already dried somewhat, this pre-heating may be briefer but it is still essential.)

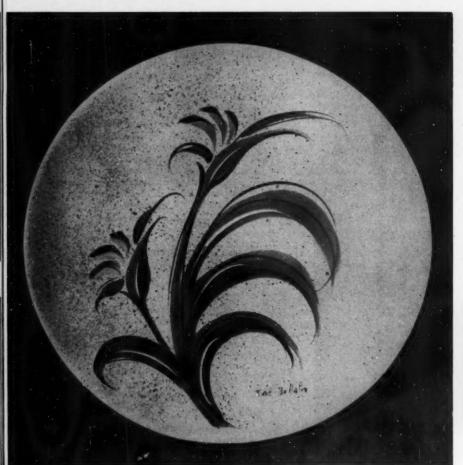
When cone 019 falls, set the pieces and cone 014 into the kiln and partially close the door to hasten heating (for top loaders I use a sheet of asbestos instead of the heavier lid).

Now you can sit back and watch the firing; or, since little seems to happen at first, you can safely concentrate on glazing other pieces. But at the end of half an hour, what's going on in the kiln begins to get interesting. By this time, the pots are usually pinkhot and what was pasty-looking glaze is taking on an increasing sheen.

Perhaps in the long last ten minutes before the cone falls — the soaking period — you'll be tempted to take the pieces out because the glaze will look mature; try it if you like, but leave one piece of the same color in for the full time and compare the quality of the two. After frequent trials, you will become able to judge the maturation point so closely that you can dispense with cones altogether! (Nevertheless, I still use them if weather or stacking conditions are unusual.)

But until you have experience, watch the cone. Put on your asbestos gloves (and safety glasses if you like).

(Please turn to Page 30)



In this series of articles, no specific brand of underglaze is either suggested or implied. The nationally advertised brands are highly competitive in quality and price;

Mr. Bellaire's advice is to use those brands you feel give you the best results.

# The CM UNDERGLAZE Series

CREATED SPECIFICALLY
FOR THE HOBBY DECORATOR

# 9. FLOWER MOTIF



demonstrated by MARC BELLAIRE



A spattered background starts the decoration; then the leaves, stem and sheath (1) are painted in (dark green) with single strokes of the large, satur-



ated brush. Accents (dark blue-green) go in next (2). Now the flower—. The three middle petals (3) are short, curved strokes in yellow for the bottom



portion, and a similar stroke in brown for the top part. Two purple petals (4), one at each end of the other petals, completes the flower. High-

# DECORATE with UNDERGLAZES

n his first article in the Underglaze Series (August, 1956) Marc Bellaire impressed two major points on the reader.

First, he pointed out that the commercially prepared underglazes are virtually fool-proof: "If the decorator follows a few simple rules he can avoid the 'common' defects." The second major point dealt specifically with decorating: "If you learn to mentally break down a motif into a series of basic shapes, the designing and decorating becomes simplified."

Included in that first article, and in each article thereafter, was a list of three basic rules designed to help the decorator get maximum results. We learn that there are still many unhappy decorators who are encountering various difficulties. It appears, therefore, that a review of the "basic rules" is in order.

1. Work on green ware or bisque that is clean and slightly damp. Dust, fingerprints and other forms of surface dirt should be removed by wiping the piece several times with a quite damp sponge immediately before dec-

orating. Don't be timid! A slightly roughened, damp surface is ideal for brush decorating.

To do an effective job, the sponge should be quite damp as stated. This means that with only slight pressure you should be able to squeeze water from it. A sponge that is only slightly dampened will be ineffective and, in fact, may actually produce the wrong kind of surface. Rubbing with a too-dry sponge can actually polish the surface which does not provide the proper "tooth" for brush decorating.

One of the reasons for timidness when cleaning green ware is ware that is very thinly cast. Ware that is to be finished at cone 04 or below should be cast rather heavily for maximum strength in both the green and fired state.

2. Use a large, fully-loaded brush. Work with as large a brush as the design permits, saturated to the hilt so the color flows generously when touched to the piece.

This is where most of the difficulty occurs. The decorator invariably drains most of the color from his brush by wiping it on the side of the bottle. This should not be done! Marc Bellaire not only dips his brush in the underglaze, he swishes it around to make sure it has become completely saturated. He will momentarily hold it over the bottle, until the color stops draining, and then immediately apply it to the green ware and make his stroke. In order to show after firing, a great deal of color has to be applied to the surface, and this is the only way to do it using Marc Bellaire's free brush-stroke technique.

Colors don't disappear in the kiln; if your decoration is weak or almost non-existent after firing it simply means you did not put on enough color to begin with.

3. Keep underglazes sufficiently fluid. Add water as the colors dry out to keep good brushing consistency.

The Bird-of-Paradise flower is a simple motif to reproduce. You will notice that it becomes even simpler when Mr. Bellaire shows how to construct it one shape at a time. Follow him through, step-by-step.



lights are scratched in (sgraffito) with a sharp tool, then the piece is outlined in black (5) which snaps up and completes the design. The piece was



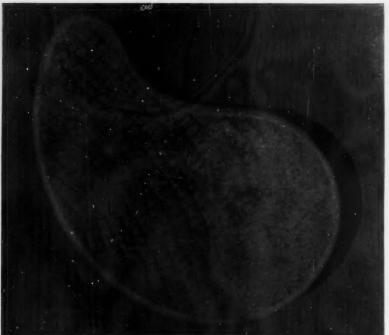
bisque fired, then glazed with a transparent matt, giving it a soft, subdued feeling. The finished piece is on the facing page.

# coming up . . .

. . . MANY MORE exciting underglaze-decorating lessons by Marc Bellaire are in the works and will appear monthly. Human and animal figures, fruit, flower and vegetable motifs, as well as special innovations, are already prepared.

Be sure to join Marc Bellaire's class in CM again next month!

(Some of the articles in the Marc Bellaire series—which started in the August, 1956 issue—can still be obtained; check the list of Back Issues Available on page 36, this issue.)



Photos: Luc Secretan

# DRAPED SHAPES

A Two-in-one

by HERMINE A. SECRETAN

ne thing leads to another in ceramics as well as elsewhere. A visit to a Vermont woodworking factory which turns out chopping bowls and similar objects led me to salvage cast-offs from their scrap pile. These had interesting concave and convex surfaces and I used them as basic molds over which and in which to drape clay slabs (1). The technique of pressing a clay slab onto a curving surface led me, in turn, to pressing in a design at the same time.

This two-in-one operation—shaping and decorating the clay simultaneously—is intriguing. First, I tried a piece of coarse-mesh bag as the impressing material: I draped the mesh over one of the convex wood molds (a plaster or clay mold would serve as well, of course), laid a slab of clay over it, pressed down gently, and

then cut out a free-form shape in the clay (2). The resulting decoration was a pleasing allover pattern, the kind of pattern which in no way dictates the contour of the piece.

While the piece was still damp and supported by the mold, a foot was fashioned from a roll of clay (3); the whole unit was then left to dry until firm enough to handle. At this point, the piece was flipped off the mold and, to level the foot, pressed down gently on a plaster bat—with care taken not to put any stress into the contour of the piece.

The texture pattern obtained by impressing lends itself to varied treatment. Sometimes I rub oxides or powdered self-glazing engobes into the surface when it is leather hard; in the case of the mesh-bag decoration, a very satisfactory effect was

obtained by leaving the mesh in place and applying an engobe over the surface, removing the mesh after the engobe had dried somewhat. This gave a two-toned surface which showed up most attractively through transparent glaze (photo, top left).

Soon the mesh bag was replaced by a variety of design elements—short lengths of raffia, bits of rubber-coated telephone wire bent into different shapes, scraps of straw tissue, etc. Arranging such materials on the convex surface of a mold and then draping a clay slab over the arrangement can be quite a tricky process; but patience can be rewarded by interesting results.

I wanted more control over my designs, however, and this led me to arranging the imprinting elements on the clay slab prior to draping the







Wooden bowls (from scrap pile) serve well as drape molds for slabs of clay. Here a mesh bag, placed over the mold, lends its design

to the clay. While the piece still rests on the mold, the footing is added. Glazed and fired, the finished piece is at top of page.

# ESand DDECORATION

ne Operation

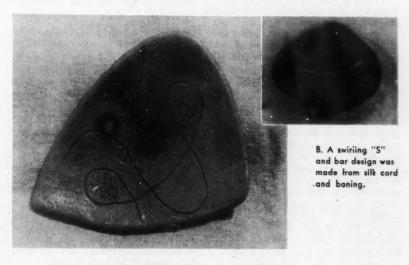
A. Raffia and a piece of straw helped create this imprint.

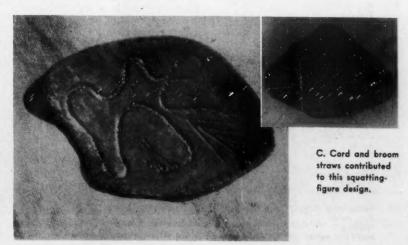
slab over or in a mold (I press the elements lightly into the clay through a piece of closely woven cloth). Decoration produced by this method can still be spontaneous and chance inspired (as I prefer); and at the same time, it can also be better related to the contour of the piece.

In this method, the design dictates the shape of the piece. I placed an end of raffia and a scrap of fancy straw tissue on a slab, for example, having no pre-conceived idea of what shape I would make the piece. It was only after trying the slab out in different positions in the mold that I finally cut the clay in a free-form shape (A).

When it comes to the elements for composing designs, one's imagination is the only limit. A length of silk cord and a short piece of boning (from my sewing basket) suggested one design (B). Another string and a few broken broomstraws yielded a squatting figure on a footless "rocking" piece (C) . . . A listing of ideas could go on and on.

I find the technique of pressing in decoration and shaping on or in a drape mold both practical and versatile. Pieces can be made fairly rapidly and they can be entirely different from each other. No production-line look here. The method allows full artistic freedom: pieces produced in this way can be as creative as the person who makes them!





# Strictly Stoneware

# ... slip glazes (cont.)

## by F. CARLTON BALL



WITH CONE 8 to 12 firings Albany slip glazes can be extremely fascinating. The glaze should, of course, be tried by itself first of all. By "trying it" I mean applying the Albany slip thickly on one pot and thinly on another;

trying it out on a number of the stoneware clays—on a nearly white clay, a buff and a reddish clay. The results will be rewarding and will pave the way for more tests.

The tests should be fired in both oxidation and reduction atmospheres if possible because the type of firing makes a difference. An oxidation firing will emphasize the brown-black effect while just a little reducing atmosphere (about 10 minutes at cone 9 or 10) will change the color to a khaki, a lighter-brown opaque glaze.

Some of the following glaze mixtures might be tried out. In using them, however, the effect of temperature and atmosphere must be remembered. Some may become beautiful in an oxidation atmosphere yet the same glazes may be useless in a reduction fire, and vice-versa.

A	LBANY SLIP GLAZES,	cone 8-12
#1.	Albany slip clay	75%
	Red iron oxide	10
	Feldspar	5
	Rutile	10
	Rutile	10
#2.	Albany slip clay	85%
-	Lepidolite	5
	Yellow ochre	10
	TOTAL SCHOOL	
#3.	Albany slip clay	47.4%
	Feldspar	38.2
	Ball clay	7.3
	Red iron oxide	4.7
	Borax	2.3
	Dorax	4.0
#4.	Albany slip clay	85%
	Nepheline syenite	15
	replicate syeme	
#5.	Albany slip clay	75%
*	Nepheline syenite	15
	Red iron oxide	10
	Act non oxide	10
#6.	Albany slip clay	75%
	Colemanite	10
	Rutile	10
	Iron	5
	11011	
#7.	Albany slip clay	80%
	Whiting	15
	Red iron oxide	5
#8.	Albany slip clay	75%
	Zinc oxide	10
	Whiting	10

Red iron oxide

5

#9.	Albany slip clay	70%
	Zinc oxide	10
	Talc	15
	Red iron oxide	5

For the potter who wants to know the composition of Albany slip clay, the following representative analysis may be helpful:

Silica	56.75%	to	50.09
Alumina	15.47	to	19.6
Red iron oxide	5.73	to	8.2
Lime	5.78	to	3.9
Magnesia	3.23	to	1.4
Titania	1.00	to	0.0
Alkalies	3.25	to	6.4

Karl Langenbeck has given a formula for Albany slip clay as follows:

 $\begin{array}{c} 0.195 \ K_2O \\ 0.459 \ CaO \\ 0.345 \ MgO \end{array} \bigg\} \underbrace{ 0.608 \ Al_2O_3 }_{0.081 \ Fe_2O_3} \bigg\} SiO_2 \ 3.965$ 

If 0.1 per cent of B<sub>2</sub>O<sub>3</sub> is added to the R<sub>2</sub>O<sub>3</sub> column, the .608 of Al<sub>2</sub>O<sub>3</sub> is reduced to .408 Al<sub>2</sub>O<sub>3</sub>; and the SiO<sub>2</sub> is reduced to 3.0 per cent, a glaze such as the following might be ascertained:

Keystone feldspar	117.6
Colemanite	13.6
Dolomite	63.5
Whiting	4.8
Kaolin	51.6
Flint	149.4
Red iron oxide	13.0

Two OTHER SLIP CLAYS, in addition to Albany, have been mined. One is Michigan slip clay from Romley, Michigan; the other is a slip clay from the vicinity of Elkhart, Indiana.

The material called "loess," meaning a clay that has been transported by the wind, is quite good for a slip glaze. It seems to be high in calcium and, since calcium bleaches iron, the glaze derived from loess is a mustard color. Along the Mississippi River near Natchez, great cliffs of this clay have been formed. This particular loess makes a beautifu! mustard-colored slip glaze at cone 11. With 10 per cent whiting, it gives a mustard-colored glaze at cone 9½ while the same glaze at cone 11 becomes opalescent.

Mud from lake bottoms near Madison, Wisconsin, when mixed with 10 to 15 per cent whiting, give beautiful reddish-brown and tan-yellow slip glazes at cone 9.

Red Cedar Heights clay, from Zanesville, Ohio, makes an excellent glaze when the right fluxes are used:

Brown-black Glaze at cone Cedar Heights clay Whiting	90% 10
Black Glaze at cone 10 Cedar Heights clay Whiting Dolomite	80% 10 10

With the proper fluxes, Red Dalton clay (United Clay Mines) gives a good glaze at cone 10 and 11:

Brown-black Dalton clay Whiting	Glaze	85% 15
Brown-black Dalton clay Dolomite Whiting	Glaze	80% 10

The following mixtures will give something of an oil-spot glaze when fired at cone 11 oxidation:

Dalton clay	45%
Cedar Heights clay	45
Whiting	5
Dolomite	5
Cedar Heights clay	42.5%
Dalton clay	42.5
Dolomite	10.0
Gypsum	5.0

Another product of the United Clay Mines, called "Sadler clay" has the same effect as the old Albany slip clay had. A mixture of 98 per cent Sadler clay with 2 per cent dolomite makes a very effective glaze; 96 per cent Sadler clay plus 4 per cent gypsum produces a brown and black glaze with something of a hare's-fur effect.

In many parts of the United States there are outcroppings of shale. If a potter took shale that was quite weathered and soft and ground it into a powder, this powder would in most cases act like a slip glaze. The powdered shale with from 5 to 15 per cent whiting or dolomite, or a combination of whiting and dolomite, would give a brown or black glaze.

It seems as though practically any red-burning surface clay could make a glaze. Clays from lake beds, river beds, mud puddles, or similar locations where the finest particles of sediment have been deposited, make the best sources of supply. Such clay should be made into a very thin slip, and allowed to settle overnight. After this settling the extra water can be decanted, then the top half of the clay scooped off and put aside to dry. This top clay is the most finely divided and more apt to make a good glaze than the clay which settled out first, which

(Please turn to Page 34)

# cm briefs...

# Wall Plaque from Patterns

by PHYLLIS E. CUSICK

Amusing plaques in low relief can be made with the greatest of ease from a slab of clay. It is simply a matter of cutting out the individual parts and then arranging them on a flat background. The colorful clown plaque you see here was made by this method.

First, we sketched the motif on paper. Then we cut paper patterns for several of the parts such as the round head, tall hat, collar (two short strips), and big bow (two long, wide ribbons). A pattern for an oval large enough to frame the clown effectively was also made.

The parts were cut from a large slab of clay rolled to a thickness of about one-fourth inch. Each part was then removed most carefully to avoid distorting its shape. To give the effect of a frame, the oval plaque was lightly thumbed along the edge as a piecrust might be.

Assembling the parts of the motif came next. The round head was placed near the center of the plaque; the hat was set in position and then a few lines were scratched in the crown. Each eye was made up of two balls of clay—a larger ball set on the face with a smaller flattened ball pressed on top of it. Tiny holes to suggest pupils were made with the point of a pencil. Other features were then added: crescent shapes for eyebrows, a rolled wad of clay for the nose, wide lip shapes for the mouth.

Each of the two short strips of clay which had been cut from the slab were bent over in a curve and fastened at either side of the chin to suggest the clown's ruffled collar. The long strips were also folded and brought together in the form of a huge bow.

Because we were working with very soft clay and on



a horizontal surface, very little slip was needed anywhere to make the various parts stick to the plaque.

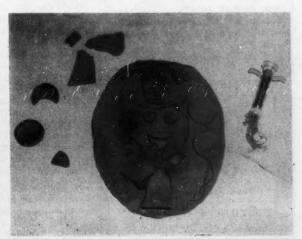
The clown's spaghetti-like hair was made by forcing clay through a tool made especially for the purpose (a strainer could be used instead). Some of the clay strings were also used with balloon shapes placed on either side of the clown. Finally, a small hole was made in the top of the plaque so it could be hung if desired.

After slow drying to prevent warpage, our clown was decorated in the bright brash colors of the circus—red, yellow, blue, black, green.

The cut-and-arrange method of making the clown plaque is one that can be used for just about any motif. Being both easy and fun, it is a method which appeals particularly to children and to adults who are just beginning to make ceramics. The plaques can be gayly decorated with underglaze colors and covered by a transparent glaze or with the opaque decorative glazes commonly known as "majolica glazes."—Avon, Ohio.



Plaque parts are cut from a slab of clay, using paper patterns (marked with X) as guides.



Clown face and accessories are worked together on plaque, piece by piece. The completed plaque is at the top of the page.





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## **Enameling: Champleve**

(Continued from Page 16)

with transparent colors plus a touch of foil for accent.

1. The design is traced with carbon paper onto the face of the piece (the underside has been counterenameled with flux). The outline is then scratched lightly into the surface of the metal with a pointed tool so that it will not disappear as the work proceeds.

2. The portion of the metal which is to remain exposed in the finished piece must be protected against the effects of etching fluid. Asphalt varish—available at paint stores, easy to handle, inexpensive and quick-drying—is the "resist" material used.

To prevent a ragged edge from de-

To prevent a ragged edge from developing during etching, the edges of areas covered with varnish must be clean and neat. A thin line of the varnish is, therefore, applied first along the very edge of the design with a tiny (00) brush, the brush being cleaned frequently with a little benzene, then dried with a cloth.

3. The neatly outlined spaces are then filled in with a larger brush. When the varnish is dry, it is checked for thin spots, pinholes, etc., (a small magnifying glass is a big help here). Any necessary patching is done now—working or handling the varnish later when it has reached the gummy stage would cause irregularities.

4. All of the copper to be permanently exposed must be protected—if you don't want it to be etched! So the piece is turned over and the rim and blank space left for findings at the back are varnished. If the piece had not been counterenameled, the entire back would require coating.

5. Now the metal is ready for etching. Ferric chloride solution is to be used. First, the piece is placed in a jar-suspended from a wire or set on a trivet (both methods are demonstrated here); in either case, the device must have been treated with a coat of asphalt varnish to prevent its disintegrating under the extremely corrosive chemical to be used. The piece is placed in an upside-down position so that the particles of copper, as they are eaten away, will fall off the surface. Everything must be in order at this point because it will be impossible to see through the solution which is dark-colored.

6. The ferric chloride mixture is poured in the jar, not directly over the piece but alongside so it will not be disturbed. If a trivet were being used, only enough liquid to cover the piece would be poured, leaving the trivet top exposed for easy handling.

(When acid solution is used, the procedure is somewhat different. The piece is laid in the bath with tongs, face side up. As the acid eats away the copper, bubbles gather and these must be swabbed off the surface frequently in order to obtain an even etch. A soft piece of cloth, wrapped around a small stick and fastened with a rubber band, makes a good swab.)

7. The etching process goes on until the design is eaten away to about half the thickness of the copper. Progress is checked every half hour or so by running the fingers over the surface of the piece. To do this, the piece is taken from the jar with the wire still attached (or trivet, as the case may be) and held under running water. If the etching is not yet deep enough, the piece is set into an empty jar and the solution again poured in beside it (this alternate use of two jars works conveniently for me). If at any point along the way the asphalt coating needs patching, the piece must first be washed and dried, then patched and allowed to dry again before being returned to the bath.

(Acid etching requires the same frequent checking under running water and the same procedure if the varnish needs retouching. As indicated earlier, etching time with acid will be affected by its strength.)

When the etching is deep enough, the piece is again rinsed and dried.

8. Every speck of varnish must now be removed. Acid will not clean it off because the varnish resists acid, but benzene will do the job. Most of the varnish can be taken off with a soft cloth wet with benzene; then scrubbing with a stiff brush dipped in benzene gets at scraps which may still be sticking around the edges.

9. After every trace of the asphalt varnish has been removed, the piece is scrubbed with a toothbrush—first with pumice powder, then, with detergent; then rinsed and dried. The outer edge of the piece—originally cut a little larger than needed—is filed smooth. (If holes were required, they would be drilled at this point.)

The piece is cleaned in acid for a

The piece is cleaned in acid for a few minutes to remove finger marks and foreign matter, polished with steel wool, washed with detergent, rinsed under hot water and dried. This completes the etching.

The recessed areas created in the copper may now be filled with enamel colors by the wet inlay technique; and special effects, such as a gold-foil accent, may be added. This part of the champleve process will be described in detail next month.

(To be continued)



conducted by KENSMITH

Q. I have had a wet, prepared clay wrapped in plastic for quite sometime and it is beginning to give off a disagreeable odor. Is this clay still usable? Can clay spoil?

A. A sour odor does not mean that the clay is spoilingquite to the contrary. It indicates that harmless bacteria are at work in the clay feeding on the organic matter which is present in all clay. This activity makes the clay more plastic and workable

Q. I am using an electric kiln which gives me good firing service; however, fine hairline cracks have been appearing in the refractory-brick wall. Does this mean that the kiln is defective? Incidently, I have tried repairing these cracks but after several firings the mended places open again. Do you have any suggestions?

A. Fine cracks will often show up in the lightweight insulating brick used in electric kilns. This does not indicate an inferior kiln; in fact, it is to be expected because of the shock to the insulation due to the fast heating and cooling which is inherent in small electric kilns.

Where pieces of the brick do not fall out, the cracks are best left without cement. The very porous nature of insulating brick makes it difficult for the cement to hold even during drying. It is evident that the cements you have been using lack proper bond after firing. Most ceramic studios and kiln manufacturers can advise you of a good refractory cement.

Q. I have heard the term "wood-ash glazes" and wonder if this really means glazes containing wood ashes as part of the ingredients. Can you supply some information on this?

A. This most certainly does mean glazes containing wood ashes. A detailed article giving full how-to-make-them information appeared in the October 1955 issue of CM. Many of the ceramic books also contain information on this subject.

Q. Is it possible to enamel on sterling silver?

A. Although it is feasible to enamel on sterling silver, the results are questionable. Enamelers invariably use pure silver or pure silver foil if they wish to work with this metal. Because of the small percentage of alloy in sterling silver, black discolorations can appear during the firings of a piece.

Q. I found a large deposit of clay in a nearby area and have tried using it for pottery making. The results are not too good—the pieces show a large number of small cracks when they dry and they crack even more in the kiln. What additions can be made to improve the drying and firing qualities?

A. It is not possible to answer without working with the material and analyzing it. A local potter or another experienced individual in your area might be able to suggest additions which would render the clay quite useful. Keep in mind, however, that not all clays can be made to behave properly. This may be one that would best be left where it is.

All subscriber inquiries are given individual attention at CM; and, out of the many received, those of general interest are selected for answer in this column. Direct your inquiries to the Questions Editor; please enclose a stamped self-addressed envelope.



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## Make your own Raku

(Continued from Page 21)

Have a bucket of cold water close by. Suddenly the cone will go down. Then, and it may take extra courage the first time, reach into the hot kiln with your tongs, firmly grip a glow-ing pot, lift it out, and lower it carefully into the cold water.

The water spits and boils up quickly (despite the steam, peer in at the unbelieveable change in your piece). As soon as the sizzling stops, the pot will be cool enough to pick out with your bare hands. No waiting; it is wonderful. Observe the satiny depth of the crackled glaze. How pleasant it is to the touch. See how much better the area looks where you were extra generous with the glaze. There are a few pinholes, true. but how intriguingly the color has changed around these tiny craters.

Don't look too long! The other pots are maturing fast. Better empty the bucket and refill it with clean, cold water: if you're negligent about this, the next pieces may come out too opaque or even scummy.

THE TONG MARKS show on your raku. In Japan, these are considered a virtue, revealing as they do one step in the making of the pot. But if they seem like scars to you, learn to operate the tongs so deftly that only two slight depressions will be left in the surface of the glaze. You can also plot in advance where to make the marks so they can serve as accents.

When brand new, raku is not as durable as higher-fired ware; it is porous and, if used to hold liquid, will leave moisture rings on the table. But not for long-with time the pores and glaze crackle fill up, making the ware water tight and stronger. (In my family, we have used one piece of raku for twenty-four years; and I have drunk tea from Japanese cups used for more than a hundred years!) If you are impatient, however, and want to hasten sealing of the clay pores, put sweet milk in the new pot and let it stand a day.

Are you wondering what the effect would be if you deliberately fired for a longer time to strengthen and waterproof raku? You would have no trouble with the glaze's burning out before cone 02, but the semi-crystals of the lower temperature would become fused and the glaze would look most ordinary-something like kitchen paint. In strengthening the body you would lose the waxen character of the glaze which is one of raku's most attractive qualities.

Another attraction is the wide range of color that is possible. For a

variety of colors from white to black, you may want to use the following table, adding the colorants to the basic glaze recipe given earlier in the text:

White 7% tin oxide

Ivory 15% tin oxide 2% rutile or 2% red iron to oxide or 5% Barnard clay Buff

Celadon 15% tin oxide (gray-1.5% nickelic oxide black .3% chrome oxide green)

.5% to 7% tin oxide .02% to .05% cobalt car-Blue bonate or oxide

Pale )5% tin oxide 3% copper oxide Green

5% tin oxide 3% manganese dioxide Eggplant 1% cobalt oxide

3% to 15% red iron oxide Brown 2% manganese dioxide Black 1% cobalt oxide

You will find that low-fire, whitelead glazes tend to look like refrigerator enamel. This can be avoided on red-clay ware by applying the glaze thinly and letting the color of the clay burn through. You can produce beautiful off-whites by adding a small quantity of an oxide in this way: stir the oxide in clean water, allow it to almost settle and then gently pour off the liquid, into your glaze, as you mix

One sees beautiful persimmoncolored glazes on Japanese raku. These are said to be obtained by basting raw-ochre slip on white-clay bodies before the bisque firing, then glazing with a transparent glaze. In my own experimenting, however, I have failed to come close to the essential vividness that distinguishes the

Japanese pieces. Crackle is typical of raku glazes (sudden exposure to cold is the cause), but if for some reason, you do not want this to happen, it can be prevented. Three percent of bentonite added to a dry batch of ingredients will temper the glaze yet not affect its characteristic smoothness. Pitting of the glaze, caused by grog openings, can be reduced by polishing and rubbing the clay body while it is in the leather-hard stage, prior to the bisque firing.

No doubt you will feel uneasy about the danger of using free lead in a glaze for serving dishes. But don't be alarmed: if you soak the finished dishes overnight in a mixture of two tablespoons of vinegar to a quart of water you can never be accused of Medici plots!

(Please turn to Page 34)

# Suggestions

#### IDEA FOR MOLDS

Some molds for small objects or for "edge cast" plates and saucers have very small pouring holes. Very often, therefore, the pouring hole will be filled with solidified slip before the mold action is complete, resulting in a dent or a hidden air cavity.

To prevent this from happening, coat the walls of the pouring hole with



thinned shellac. This keeps the entrance hole from casting at all by killing the absorbency of the plaster; the slip can now flow into the mold and the entrance hole remains open at all times.

For best results, use thinner than usual slip on molds of this type.

-E. Gustavson Jacksonville, Fla.

# PINHOLE ELIMINATOR

To eliminate air bubbles and impurities from my slip, I screen it through a nylon stocking.

I knot the stocking at the ankle and cut off the foot end. This is thoroughly wet with water, then stretched over the top of a gallon jar and the slip poured through slowly. I have found that this has completely eliminated pin holes in my finished, cast greenware.

-Marion Hannapel Jomar Studio Oak Lawn, Ill.

## SLIP FOR THROWING

When throwing on the wheel, use slip instead of water for wetting the hands and for lubricating. It gives

better lubrication and it prevents a piece from collapsing because of surplus moisture. You don't have to make special slip-save the slip that collects in your wheel well after throwing. The slip, of course, should be made from the same clay that is used for the throwing.

-Lillian Noble Nebraska City, Nebr.

#### DECORATING IDEA

A whole field of new and interesting effects will open to you if you try the following "black-and-blue" idea.

Apply the decoration to the green ware in the black underglaze or perhaps merely sponge on a black background, then glaze overall with a transparent glaze of a deep color. Royal blue is especially effective.

The black underglaze comes through almost like a shadow effect to make a particularly handsome piece.

> -Peg Townsend Tucson, Ariz.

#### STRONGER SMALL MOLDS

Small plaster press molds like those used for jewelry are easily chipped and broken after some use. One way to lengthen the life of these fragile items is to pour the plaster in a container which will become a permanent housing for the mold.

The best container I have found is the small aluminum



pan that frozen foods come in. Small cardboard containers are also serviceable; however, they can become damp and then peel away. The thin metal pan is, of course, impervious to liquid and is the better idea.

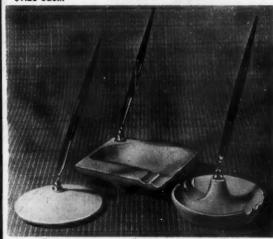
> -Peg Townsend Tucson, Ariz.

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# IDEAS for the decorator

by BEE BASCH

# GLAZE CONTROL for interesting effects

In ceramic decorating one procedure is to start with the clay piece and choose a glaze to enhance it. On the other hand sometimes a glaze may be so appealing we design or choose a piece to show off the glaze

to best advantage.

"Art glazes" hold a particular fascination for me. These are the glazes that will flow or will mottle; will develop crystals or specks in some areas and not in others; will give all sorts of unpredictable but beautiful results. But the results need not be unpredictable! If you take time to test glazes properly and explore their potentialities you will find that you can control them and obtain the specific results you want.

Controlling a glaze can mean dif-

ferent things.

FIRING PROCEDURE is one factor that has a great deal of influence on the final appearance of an art glaze. It will make a big difference, for example, if the piece is fired quickly or slowly; if there is a long soaking period during the time the cone is bending; if it is slightly underfired or slightly overfired; if the kiln is cooled particularly fast or slowly; and so on. Careful notes should be kept during the firing of a glaze so that the same results can be repeated.

THICKNESS OF APPLICATION is another important control point. A very thin layer of glaze will behave quite differently from a very thick layer and there will be differences in between.

The body upon which the glaze is applied is of equal or perhaps even greater importance than the other two factors. The ingredients of the glaze will often react with the ingredients in the clay body to give a variety of effects. If you can obtain a specific effect by controlling the firing schedule and by applying a glaze to a certain thickness, and if you know how it will behave on a certain body, you can produce a variety of well-controlled, interesting effects, even a combination of effects, on one piece.

A couple of experiments of this type are shown in the illustrations here. The same glaze was used on each of the pieces shown. I had tested this glaze on seven different clay bodies. On a white clay it fired to a rich gold color. On five different brands of red clay it fired to a dark brown. On Jordan clay it gave a brown-speckled-with-gold effect.

Fortified with this information, and knowing how to fire the glaze to obtain a specific result, I was able to come up with some interesting art effects which I planned and controlled all the way.

The "whale" ash tray was cast in a red-clay slip and the inside portion was sprayed with a white-clay slip. After bisque firing at cone 06, it was glazed with a particular glaze by



spraying heavily and then fired according to my predetermined schedule. As you can see in the illustration, the center section (white-clay body) is a rich speckled gold; the outer edge (red-clay body) is a rich brown color. Together, they make an extremely handsome combination.

The "boomerang" ash tray is another successful experiment which I was able to control all the way. By controlling the thickness of application, the firing schedule, and the combination of clays used, I was able to



obtain the gold speckled decorative section and the very lightly speckled surface on the rest of the piece. I hope that this brief discussion of

I hope that this brief discussion of these simple experiments will inspire you to try a similar experiment with (Please turn to Page 34)



#### METALCRAFT

Not too long ago when I had my training in the art of enameling, there was no question and no doubt about one point—that enameling and metal-work go together. To be admitted to the top you had to be proficient in both crafts. It was only natural. The enameler had to make his own metal bases; if he was too busy, he got some help or designed spinnings to be made up for him, but that did not change the basic rule that he had to know his metalwork.

Times have changed a great deal in a very short time. Life has become easy for the enameling enthusiast. He can buy an endless variety of copper blanks for jewelry and trays large or small in size, abstract or conventional in style. Many people use these exclusively and do not think of bothering to make a form by hand.

But metalwork for enameling is really not at all difficult. It is worth your while at least to try it. Your enameled pieces will have added quality: they will become more individual, more interesting and, through the handmade touch, more precious. Only a few, inexpensive tools are needed. I will give you a few hints about working metal; use them, and you will have no trouble with any form you desire for jewelry, plaques, tiles or even trays. It is the way I work and I have done literally thousands of pieces this easy way. In forming the basic shapes described here you can acquire the knack for all shapes.

Two of the examples will be domed—doming gives strength to the handformed metal base. (Enamels need a lightweight base; and heavier metal does not prevent chipping and warping.) I use 24- or 26-gauge metal for earrings, pins and such; for pieces to be placed in jewelry settings, the metal can be much thinner. What I am saying applies to pieces to be enameled on both sides (as a good enameled should be), but if you insist on one-sided pieces, use a heavier metal.

#### Doming a Disk

Whether it's as small as a dime or as large as a salad bowl, this is the way to make a domed disk. With a pointed instrument and never a lead pencil (it leaves traces after firing), draw a circle on your copper or silver or, if you are very ambitious, on your gold. Cut out the disk and smooth the edge with a file or Carborundum



stone. With a wooden mallet flatten out the metal on a straightening plate. Now place the disk on a board (I use my desk and with the passing of time have hollowed out quite a few very convenient "molds" in it), and hammer it with a ball hammer until it is domed as deeply as desired. Then put it back on the straightening plate, concave side up. Hold the piece down with the fingers and start hammering it (see sketch, left half). Use a small flat hammer or a ball hammer depending on how you want the hammer blows to look. Start hammering at the center of the piece and work out from there in a tight spiral that grows larger and larger until you come near the edge. Stop there; if you don't, the edge will become scalloped. Now turn the piece over so the concave side is down and make sure the rim sits level on the straightening plate all the way around. If it does not sit quite nicely on the flat surface, repeat the hammering process until it does. But if there are only a few stubborn points in the rim, you can usually work them out by tapping the convex side with the mallet.

With experience you will discover tricks of your own for doming a disk, but basically the method described works in a jiffy and for either round or free forms.

#### Doming a Rectangle

When a square or oblong shape is to be domed, you handle it in the same way as the disk except for one thing. Hammer, with very easy blows, two diagonal lines from the lower left (Please turn to Page 36)

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Make your own Raku

(Continued from Page 30)

When first working with raku, the ceramist is surprised and satisfied with having produced a pleasingly glazed object. The next challenge seems to be enrichment of the surface. Remember, though, that a tradition of restraint and simplicity goes hand in hand with raku.

Special effects and techniques can, however, be employed as easily in raku as in other ware. You can mottle the glaze by applying light coats over dark ones; make lines or patterns with underglazes or overglazes; design with stencils or various resist materials. Rutile dusting while the glaze is still slightly damp is effective; and illiminite granular patterns are good unless the scratchy surface they create would be unsuitable for an object meant to be held in the hands.

Taking a cue from the enamelists, I have even wet inlaid different-colored raku glazes on fairly flat-surfaced pieces such as ash trays and plates: using putty-stiff glazes, I push the colors in place with a pointed tool and allow longer drying time than usual. If the firing is watched closely, such pieces can be snatched from the kiln before the juxtaposition of colors becomes undesirably blurred.

Another experiment I have tried is cooling raku by the simple-thoughslower method of exposing it to the air instead of dunking it in cold water. The one object so treated-a large piece of sculpture designed to have strong crackled areas—was dis-appointing: the "crackle" consisted of almost invisible hairlines that not even strong tea or oxides would bring out, and the glaze had little of its customary depth.

In conclusion, I would say that for the ceramist who thinks in terms of flawless delicacy, raku will have little appeal. Along with the lovely waxen quality of the glaze, there are inevitably the thick body, the tong marks, occasional pinholes. But it occurs to me that in a time when we see so many forced clay shapes, tricky glaze effects and over-decoration, fresh values might well come of producing pieces as straightforward and earthy as raku.

# Decorating Ideas

(Continued from Page 32)

some of your own art glazes. The information you collect from your glaze experimenting can lead to the coveted, one-of-a-kind piece that only you can duplicate. One thing for sure-it will lead you to a great deal of fun and satisfaction.

## **Visually Handicapped**

(Continued from Page 19)

failures or perhaps the complete frustration of not succeeding at all. An instructor working with the visually handicapped child must, therefore, have a great deal of patience, and must be there with a helping hand when it's really needed."

When we asked her about the personal angle, she was quick to respond with her own experience. "Well, such a class offers a tremendous challenge, and you experience a great thrill when you see that you are really helping open a door to a whole new world for these youngsters. By sincerely offering the visually handicapped child a friendship that the child can sense is real, by offering him the love and confidence he needs to motivate further exploration, the blind child many times surprises and exceeds your own expectations for him. And then, there is that wonderful part of rediscovering your own sense of touch. You know, not until I began to teach these children did I really begin to 'see' a piece of sculpture or textured wood, etc., as it should be seen. I had always substituted my eyes and I'd missed much for there is a great deal of beauty in the world which should be enjoyed through touch, and these youngsters have helped me to rediscover this important fact."

Yes, here in this little gray stone building, on Milwaukee's near-East side, there are great strides being made in teaching the arts and crafts to the visually handicapped child. Here, also, instructors learn many things. I would like to personally salute CAP for the excellent job they are doing and would like to urge other groups or individuals throughout the United States to meet the challenge by starting classes in their own cities.

own cities.

# Stoneware: Slip Glazes

(Continued from Page 26)

would have too much sand in it.

The local clay, perhaps found in the potter's own backyard, can make a glaze when mixed with the right flux and fired to cone 10. Some suggestions on fluxes and the amounts to use are as follows:

Whiting		2%	to	15%
Dolomite		2		15
Zinc Oxide		5	to	15
Magnesium Carbonate	*	2	to	8
Talc		2	to	15
Borax		2	to	5
Lead Carbonate		2	to	10
Colemanite		1	to	15

These slip glazes made from local clays can be the most inexpensive of glazes and also the most beautiful.

# Ceram Activities

#### MEET OUR AUTHORS:

- Karl Martz, teacher and potter par excellence, was one of CM's earliest special contributors. In the first year of the magazine's existence, 1953, he not only wrote on decorating with engobes but also a three-part series on decorating clay with clay (Sept., Oct., Dec.). Karl teaches ceramics at Indiana University, Bloomington and with his wife, Becky Brown, runs a potshop in the Brown County art colony at Nashville, Indiana. An incurable investigator of methods and techniques, himself, he would like through his articles to create in the reader "an unquenchable desire to try these things."
- Though Raku bowls were an important part of the Oriental tea-drinking custom while Freda de Castro was teaching in Shanghai, she did not begin experimenting with Raku glazing until she returned to the United States. Now she feels that Raku has a definite place in American ceramics. In most of her work with Raku, Mrs. de Castro has been guided by the writings of Bernard Leach, the British ceramist who has introduced so many Japanese techniques to the Western world.

Mrs. de Castro, who earned a M.F.A. degree from the University of Florida (ceramics her major), is presently teaching in the Adult Education Department at San Jose, Calif. In her first article, "Japanese Raku," (CM—October, 1956), Mrs. de Castro tells us about the origin and general technique of Raku glazing in Japan. This month she completes her series with a step-by-step description of her method for making Raku.

"My love for clay dates back many years," says Swissborn Hermine A. Secretan but although she took courses in design and modeling in Switzerland it was not until she came to this country (1948) that she realized a long-cherished ambition to learn throwing on



the wheel. "This ancient craft has an evernew fascination for me... I live with my pots—casseroles, beakers, vases and bowls are in constant use. But once in a while the urge to build something by hand, to getaway from the round and symmetrical, becomes very strong, and then I indulge in free form and chance-inspired decoration." Mrs. Secretan lives in Washington, D.C.

KRETSINGER JEWELRY A WINNER: Mary Kretsinger, whose articles on ceramic jewelry appeared in CM last August and December, and whose "Mishima Decorating" article was



featured in January, has received one of twelve Purchase Awards totaling \$2000 made at the Second Exhibition of American Jewelry and Related Objects. Her winning entry is an enamel-on-gold pendant with girl-and-cat motif (see photo). It is one of 200 items accepted by the jury from over 1600 entries. The exhibition, assembled by the Memorial Art Gallery of the University of Rochester and sponsored by the Hickok Manufacturing Company, has begun a two-year tour of American museums under the banner of Smithsonian Institution.

WICHITA EXHIBITS: The first exhibition of the Wichita Ceramic Art Society, November 3 and 4, was attended by over 600 people. The 456 show entries, representing five states, were classified into 12 groups. Three prizes, owarded in each class, totaled \$500 in donated prizes from studios, dealers, suppliers and publications.

Officers of the Wichita Ceramic Art Society are President, Mrs. Edna Florenz Mueller: Vice President, Mrs. Minnie Spencer; and Secretary-Treasurer, Dr. V. A. Mueller.

NAVESINK RIVER SHOW: The Navesink River Ceramic Guild held its annual exhibit November 13 through November 17 at the China and Glass Shop in Red Bank, N. J. (For award-winning pieces and names of winners, see photo).

The present enthusiastic Ceramic Guild was organized in 1952—its first meeting being called by Mrs. Walter (Bee) Basch. The twelve original members established the group's objectives—to further an interest in ceramic arts, exchange ideas and knowledge (Please turn to Page 36)

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CERAMICS MONTHLY

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## **Ceram-Activities**

(Continued from Page 35)

of various techniques and to produce one exhibit a year. Mrs. Basch became first president of the group.

Judging this year's Navesink Exhibition were two men in the field of ceramic design: Francis VonTury, Trustee for the Design Division of the American Ceramic Society: and Robert Zirlin, of Freehold, N. J. a prominent potter as well as a sculptor in both wood and ceramics, having won five national awards in the past year.



Winning pieces in the recent annual exhibit of the Navesink River Ceramic Guild are, I to r: Best of Show and First Award in the Wheel Division—Bottle by Neil Festa; First Award in Commercial Mold Pieces-Large Bowl by Adele Woodruff; First Award in Sculpture—Head by Renee Childress; First Award in Original Mold Pieces-Large Fish by Bee Basch. First Award in Slab Method—Leaf by Kate Lefferts.

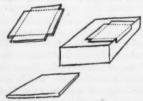
### **Enamelers Column**

(Continued from Page 33)

to the upper right corner and vice versa (see right half of sketch, page 33).

### Squaring off Rims

When you want a flat shape with corners (see sketch) cut out a piece of metal large enough to allow for turning down a narrow strip at each side. Cut out little squares where the corners are to be. Flatten the metal out with a mallet. Then set it along



the edge of the straightening plate and hammer down the side strips, using the mallet. This is a basic shape that is often needed for tiles, pins and earrings; it is also ideally suited for settings for rings and cuff links.

Shaping metal isn't difficult—is it? One more tip: always hold the hammer at the end of the handle, relax your wrist and let the hammer bounce up and down all by itself. Your job is only to hold the hammer loosely and direct its bounce. Will you try?

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Slip-decorated stoneware—Margaret Flowers



Enamel plaque (front)-Dorothy M. Fuldner

# Texas and Florida

Exhibitions bringing the best works of local craftsmen together on a statewide basis are being held in various parts of the country. Among such shows were two held recently in the South-Texas and Florida.

The Fifth Texas State Crafts Exhibition, sponsored by the Craft Guild of San Antonio, brought a First-in-Show award of \$150 to Hannah H. Stewart, Houston, for a ceramic bowl and First-in-Ceramics, \$50, to Margaret Flowers, San Antonio, for stoneware (one piece shown above). Displayed at Witte Memorial Museum, in November, the show moved on to Dallas Museum of Fine Arts for the following month.

Sixty - seven ceramists, sculptors, metalworkers, weavers and others were represented in the Florida Craftsmen's Sixth Annual State Show at Norton Gallery, West Palm Beach, last November. In this group, first prizes in ceramics went to Charles M. Brown, of Mandarin for a tall blue coil-built bottle with wax-resist decoration (see photo below) and to Dorothy M. Fuldner, Lake Worth, for an enameled portrait - plaque entitled "Mimi" (shown at left). •



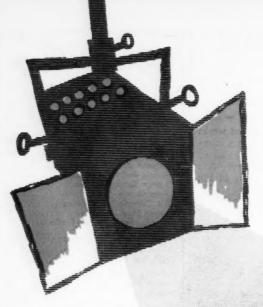
Florida pottery winners: (I to r, back row) pair of wheel-thrown lamp bases—Melvin H. Caspar, Merritt Island; and tall bottle by Charles M. Brown; (front row) covered jar-A. J. Spencer, St. Petersburg; wheel-thrown porcelain jar, Eleanor Dorman, St. Petersburg; mugand-plate set-Dorothy Darbee, Fort Lauderdale.

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